SECTION – B
SHORT QUESTION

Q – 2 If A = {1 , 2 , 3 , 4} , B = {2 , 4 , 5 , 6} and C = {2 , 3 , 6 , 8}, find (A Δ B) x (B ∩ C)

Q – 3 If a – b and a + b = 9, find the valeu of $a^2 + b^2$.

Q – 4 Find the solution set of any one fo the following equation.
(i) 2x² + 4x – 1) = 15   (ii) -6 + |5x – 3| = 3

Q – 5 Write the advantages and disadvantages of Arithmetic Mean.

Q – 6 Simplify.

   (i) $\left(\dfrac{-30 x^{10} y^8}{-5x^4 y^2}\right)^2$ (ii) $\dfrac{n\sqrt{q}}{m\sqrt{q}}$

Q – 7 Prove that : $\tan\theta + \cot\theta = \sec\theta\, \csc\theta$

Q – 8 Simplfy with the help of logarithm.

   $\dfrac{(780.6)\, \frac{1}{2} \times \sqrt{3000}}{4.000}$

Q – 9 Eliminate " x " from the equation: 3x + 4y = 22 , -4x + 5y = 43

Q – 10: Simplify: $\dfrac{x^2 (y - z)}{(x+y)(x+z)} - \dfrac{y^2 (z - x)}{(y+z)(y+x)} + \dfrac{z^2 (x - y)}{(z+x)(z+y)}$

Q – 11 Solve: $\dfrac{\sqrt{x + 10} - \sqrt{x - 10}}{\sqrt{x + 10} + \sqrt{x - 10}} = \dfrac{1}{5}$

Q – 12 Prove that, if two lines intersect, the vertically opposite angles so formed are congruent.

Q – 13 Prove that, if the line drawn from the centre of a circle to bisect a chord is perpendicular to the chord.

Q – 14 Prove that, the sum of the measures of angles of a quadrilateral is 360°.

Q – 15 Define any TWO of the following terms and draw the figures.
Acute angle – Corresponding angles – Escribed circle of a triangle